DOCUMENT RESUME

ED 457 639 FL 026 911

AUTHOR Vivaldo-Lima, Javier; Gonzalez-Robles, Rosa O.; Castillo-Morales, Alberto

TITLE Linguistic Competence Profiles in English as a Foreign Language in Mexican University Students.

PUB DATE 2001-07-00

NOTE 13p.; Paper presented at the European Congress of Psychology (7th, London, England, July 1-6, 2001). Research sponsored by the National Association of Institutions of Higher Education (ANUIES), Mexico. Authors are members of ANUITES Research Group 1.6.

PUB TYPE Reports - Research (143) -- Speeches/Meeting Papers (150)

EDRS PRICE MF01/PC01 Plus Postage.

DESCRIPTORS Academic Achievement; College Freshmen; Communicative Competence (Languages); Curriculum Development; *English (Second Language); Foreign Countries; Higher Education; Language Attitudes; *Linguistic Competence; National Programs; Pretests Posttests; Questionnaires; Second Language Instruction; Second Language Learning; Socioeconomic Status; Spanish

IDENTIFIERS *Mexico

ABSTRACT

Linguistic competence in English (LCE) as a foreign language has been acknowledged as an important determinant of academic success in higher education. The purpose of this study is to determine the LCE profiles of Mexican freshman students as well as the main factors associated with differences in linguistic competence between proficient and poor speakers of English. Freshman students (n=4,690) from nine major institutions of higher learning in Mexico City participated in this study. Subjects were administered a three-band test of LCE as well as a questionnaire on previous education in foreign languages. Differential profiles in LCE were obtained for the institutions under study, associated with type of institution (public or private) and with factors related to type of previous L2 education received during primary, secondary, and high school. Significant correlations among LCE, academic achievement, and self-perceived skill development in the second language were found. A significant correlation between socioeconomic factors of students and LCE was revealed. The existence of significant differences in LCE profiles for institutions under study makes evident the importance of revising curricula of foreign language education in Mexico. (Contains 1 reference) (KFT)

Reproductions supplied by EDRS are the best that can be made from the original document.

ED 457 689

LINGUISTIC COMPETENCE PROFILES IN ENGLISH AS A FOREIGN LANGUAGE IN MEXICAN UNIVERSITY STUDENTS

U.S. DEPARTMENT OF EDUCATION
Office of Educational Research and Improvement
EDUCATIONAL RESOURCES INFORMATION CENTER (ERIC)
✓ This document has been reproduced as received from the person or organization originating it.
☐ Minor changes have been made to improve reproduction quality.
• Points of view or opinions stated in this document do not necessarily represent official OERI position or policy.

PERMISSION TO REPRODUCE AND DISSEMINATE THIS MATERIAL HAS BEEN GRANTED BY
Javier Vivaldo-Lima
TO THE EDUCATIONAL RESOURCES INFORMATION CENTER (ERIC)

JAVIER VIVALDO-LIMA

Coordinación de Enseñanza de Lenguas Extranjeras

Universidad Autónoma Metropolitana, México

ROSA O. GONZÁLEZ-ROBLES & ALBERTO CASTILLO-MORALES

Departamento de Matemáticas, Universidad Autónoma Metropolitana, México.

ANUIES Research Group 1.6[1]

ABSTRACT. Linguistic competence in English (LCE) as a foreign language has been acknowledged as an important determinant of academic success in higher education. The purpose of this study was to determine the LCE profiles of Mexican freshmen students as well as the main factors associated with differences in linguistic competence between proficient and poor speakers of English. 4690 freshmen students from nine major institutions of higher education in Mexico City participated in the study. Subjects were administered a three-band test of LCE as well as a questionnaire on previous education in foreign languages. Differential profiles in LCE were obtained for the institutions under study, associated with type of institution (public or private) and with factors related to the type of previous L2 education received during primary, secondary and high school. Significant correlations among LCE, academic achievement, and self-perceived skill development in L2 were found. The existence of significant differences in LCE profiles for the institutions under study makes evident the importance of revising the curricula of foreign language education in Mexico.

[1] Research sponsored by the National Association of Institutions of Higher Education, ANUIES. Mexico.

BEST COPY AVAILABLE

FL026911

ANUIES RESEARCH GROUP 1.6**

Institution Representatives

El Colegio de México
Carmen Arizmendi Otaegui, M.A.

Escuela Nacional de Antropología e Historia
C. Dagmar Freisinger Ph.D.

Instituto Tecnológico Autónomo de México
Rosa Margarita Galán Vélez, M.A

Instituto Tecnológico de Tlalnepantla
José Luis Villa Aburto, B.A

Instituto Politécnico Nacional
Hortensia Amelia Pulido Alfaro M.A.

Universidad Autónoma Metropolitana
Javier Vivaldo Lima, M. A

Universidad Nacional Autónoma de México
María Aurora Marrón Orozco, B.A

Universidad del Valle de México
JoAnn Miller, M.A

Universidad Pedagógica Nacional
Oscar Fernando Velasco Romero, B.A

Statistical Advisors

Rosa Obdulia González Robles, M.A.
Alberto Castillo Morales, Ph.D.
Universidad Autónoma Metropolitana

Providing multicultural and multilingual education has become one of the major challenges of universities throughout the world. In Mexico, foreign language education (particularly in English) is integrated as a compulsory subject of the secondary and high school curricula. However, no previous studies have been reported in order to evaluate the impact of the foreign language education system in the country. Therefore, in order to carry out a diagnosis of the current status of foreign language education at the high school and university levels, the National Association of Institutions of Higher Education (ANUIES) commissioned an interinstitutional research task force, whose preliminary results are here presented.

OBJECTIVE

The objective of this study was twofold. First, to determine the LCE profiles of Mexican freshmen students and, second, to determine the main factors associated with differences in linguistic competence between proficient and poor speakers of English.

METHOD

Sample. 4609 undergraduate freshmen university students from nine major institutions of higher education in Mexico participated in the study. A random sample was selected for each institution with a .95 confidence level and 8% precision for the mean score of "Linguistic competence in English".

Instruments

- **Nelson English Language Tests (NELT).** Linguistic competence in English as a foreign language was measured through the use of a modified version of the NELT. The NELT is a battery of standardised placement tests based on a structural progression evaluating elementary, intermediate and advanced levels of linguistic competence in English. Its aim is to test both grammatical control and communicative competence (Fowler and Coe 1976). The modified version, developed by the ANUIES group 1.6, integrates, within a single 64-item test, selected items from each of the separate tests included in the battery, and is centred on the evaluation of three proficiency bands (elementary: items 1-24; intermediate: items 25-48; advanced: items 49-64).

- **Foreign Language Education Questionnaire.** A 147-item questionnaire was designed in order to evaluate the following dimensions: (1) socio-demographic data, (2) educational background, (3) previous experience and formal training in English, (4) self-perception of linguistic competence in Spanish and English, and (5) self-perception of the quality of the training received in English before entering the university.

Procedure. Each institution administered both evaluation instruments to samples of students selected at random upon entering their institutions in the academic year 2000. Answers were recorded on optically-processed answer sheets. Data analysis was done using the SPSS (*Statistical Package for Social Sciences*) and included the following statistical methods: (1) analysis of correlations among academic achievement, LCE and self-perceived proficiency in L2; (2) t-test of LCE

by type of previous education (public vs. private); (3) one-way ANOVA of LCE by institution of higher education; and (4) one-way ANOVA of LCE by student academic achievement categories.

RESULTS

Correlations among variables. Highly significant correlations were found between LCE, self-perceived linguistic competence in English (SPLCE), and general point average during high school (GPA). As can be seen in table 1, the correlation of LCE with SPLCE is higher than the one between LCE and GPA. This could be due to the fact that GPA encompasses all major knowledge areas within the school curriculum, whereas SPLCE, being a self-report measure, is specifically related with the student's knowledge of the foreign language.

Pearson's correlations (Significance level)			
	LCE	SPLCE	GPA
LCE	1.000	.505 (.0005)	.261 (.0005)
SPLCE		1.000	.177 (.0005)
GPA			1.000

Table 1. Analysis of correlations

Linguistic competence profiles by institution. An analysis of variance of LCE by institution, followed by Tukey's Honest Significant Difference Test, yielded seven homogeneous subsets (table 2). Accordingly, two of the institutions showed lower and significantly different LCE mean scores, five (subsets 3 to 5) obtained intermediate LCE scores, and two of them showed higher and statistically significant LCE mean scores. The latter profiles reflect the current entrance requirements established by the last two institutions (one public and one private) with regard to English proficiency.

Linguistic competence in English

Tukey B [a,b]

Institution of higher education	N	Subset for alpha = .05						
		1	2	3	4	5	6	7
Public 4	242	12.1198						
Public 8	619		15.3134					
Public 3	862			19.2819				
Private 2	496			20.0302	20.0302			
Public 2	494				23.1093	23.1093		
Public 5	665				23.3504	23.3504		
Public 7	1093					24.2132		
Private 1	194						44.1495	
Public 1	25							50.6400

Means for groups in homogeneous subsets are displayed.

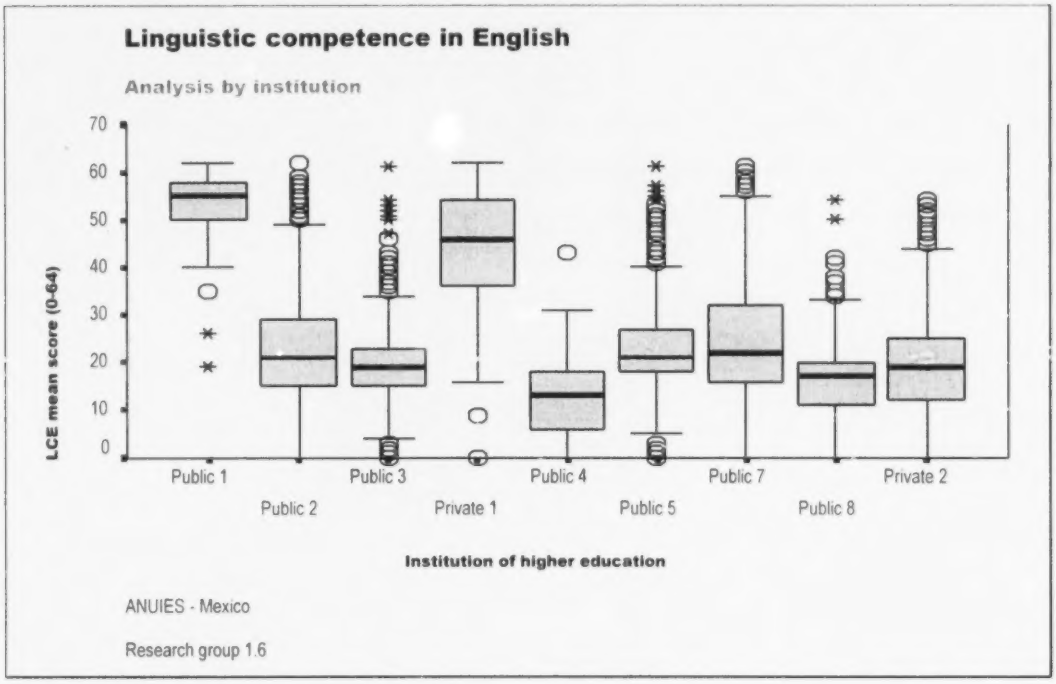
a. Uses Harmonic Mean Sample Size = 153.789

b. The group sizes are unequal. The harmonic mean of the group sizes is used. Type I error levels are not guaranteed.

Table 2. Tukey's HSD test results for LCE in English/Analysis by institution

A box plot of LCE by institution (graph 1) makes evident the differential patterns of distribution for this variable. First, plot markers for some of the institutions cover the complete range of possible LCE scores, with four institutions covering either the upper or the lower halves of possible scores. Second, an important

number of atypical cases are present in all institutions with the exception of those obtaining the higher mean LCE scores and that with the lowest.



Graph 1. Linguistic competence distribution by institution

Effect of type of institution on LCE. An important finding derived from the study was the significant difference in LCE between private and public institutions ($t=-11.663$, $p < .0005$) upon entrance to the university. The above results are consistent with the highly significant differences obtained when comparing both modalities of primary school education (private vs. public), where students who attended private primary schools (where education in English is compulsory in most cases) obtained significantly higher LCE scores than students coming from public primary schools (where L2 education is not included in the school

curriculum). Similar results were obtained for secondary (t=29.62, p< .0005) and high school education (t=18.42, p< .0005).

Linguistic competence in English Public vs. private institutions of higher education					
Type of institution	N	Mean	Std. Dev.	t-test for Equality of Means t	Sig. (2-tailed)
Public	4000	20.9270	11.5518	-11.663	.0005
Private	690	26.8116	15.6493		

Table 3. Test of LCE by type of institution (higher education)

Linguistic competence in English Public vs. private primary school education					
Type of institution	N	Mean	Std. Dev.	t-test for Equality of Means t	Sig. (2-tailed)
Public	3238	18.9994	9.9766	28.414	.0005
Private	1226	29.8874	14.5821		

Table 4. Test of LCE by type of institution (primary school)

Effect of type of previous education on LCE. An additional ANOVA test comparing groups categorised by previous education (totally private, totally public and mixed) with regard to LCE showed significant differences among them ($F = 436.01$, $p < .0005$). The Tukey test separated the three groups ordered in accordance with the amount of private education received (table 5).

Linguistic competence English

Tukey B [a,b]

Previous education	N	Subset for alpha = .05		
		1	2	3
Public	2697	18.8943		
Mixed	1306		21.7335	
Private	687			33.2838

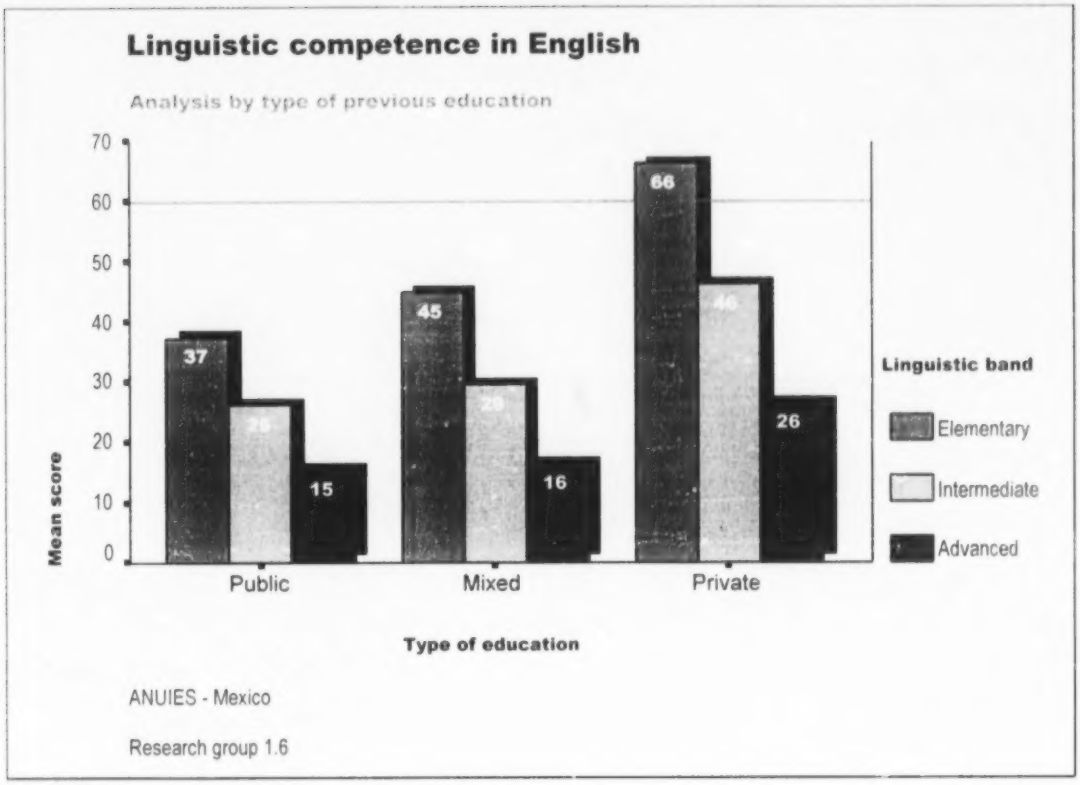
Means for groups in homogeneous subsets are displayed.

a. Uses Harmonic Mean Sample Size = 1157.370

b. The group sizes are unequal. The harmonic mean of the group sizes is used. Type I error levels are not guaranteed.

Table 5. Tukey's HSD test by type of previous education

The above results are confirmed upon analysing categories of previous education according to the subjects' performance on each of the linguistic competence bands (elementary, intermediate, and advanced). In all cases, higher scores in LCE were obtained for the group with totally private education (graph 2). It is also interesting to note the decreasing pattern in LCE scores when moving from the basic to the intermediate and advanced bands.



Graph 2. Linguistic competence/Private vs. public education

Academic achievement and LCE. An ANOVA of the relationship between LCE and academic achievement (as measured by the students' GPA score during high school) was carried out on the basis of the comparison of LCE mean scores among categories of academic achievement (very low, low, around mean, high and very high) ($F=74.88$, $p< .0005$). The results from the associated Tukey's HSD test (table 6) yielded four homogeneous subsets for LCE. The lowest LCE mean scores corresponded to the "very low" and "low" GPA categories, while the highest LCE mean score corresponded to the "very high" GPA category. That is, the lowest GPA categories were associated with the lowest LCE mean scores and viceversa.

Linguistic competence English

Tukey B [a,b]

GPA High school	N	Subset for alpha = .05			
		1	2	3	4
Low	788	18.7500			
Very low	760	18.8289			
Around mean	1673		21.3293		
High	385			25.1091	
Very high	903				26.9856

Means for groups in homogeneous subsets are displayed.

a. Uses Harmonic Mean Sample Size = 725.966

b. The group sizes are unequal. The harmonic mean of the group sizes is used. Type I error levels are not guaranteed.

Table 6. Tukey's HSD test. LCE by academic achievement.

CONCLUSIONS

- Differential distribution patterns in LCE were obtained for each one of the institutions under study, with vast and significant differences in LCE mean scores among them.

- A positive and highly significant correlation was found between linguistic competence in English and academic achievement, thus emphasising the importance of promoting foreign language education in the curriculum of higher education institutions.

- Consistent with the previous finding, highly significant differences in LCE were obtained for groups categorised by level of academic achievement. That is, the highest scores in LCE were found in the cases of students in the "very high" academic achievement category, whereas the lowest LCE scores were found in

the cases of students in the "low" and "very low" academic achievement categories.

- Socio-economic factors proved to play a determinant role in the development of LCE. Type of previous education (totally private, totally public, and mixed) led to significant differences in LCE. Furthermore, an analysis of LCE based on the comparison of elementary, intermediate and advanced proficiency bands, revealed that only the group in the "totally private" education category obtained a passing grade in the elementary band.

- The existence of significant differences in LCE profiles for the institutions under study, as well as the differences observed between public and private institutions, make evident the importance of a thorough revision of the foreign language education system in Mexico.

REFERENCES

Fowler, W.S. & Coe, N. (1976) Nelson English Language Tests. Hong Kong: Thomas Nelson and Sons Ltd.